From: (b) (6)

To: Ravi Subramaniam/DC/USEPA/US@EPA; DBurch@icfi.com; (b) (6); Cheryl

Scott/DC/USEPA/US@EPA; Karen Hogan/DC/USEPA/US@EPA; KennyCrump@email.com; nsteenl@emory.edu;

Paul White/DC/USEPA/US@EPA; rgentry@Environcorp.com; sEftim@icfi.com; Weihsueh

Chiu/DC/USEPA/US@EPA; WMendezJr@icfi.com

Subject: Re: NCEA comments on human protocol

 Date:
 08/25/2010 02:57 PM

 Attachments:
 RiskAnalRoadMap19Dec07.doc

Dear Colleagues,

Attached is a paper I did a few years ago for EPA that includes (beginning on page 87) a case study of the possible effect of exposure uncertainty in estimating low cancer dose risks for ethylene oxide. My expectation is that the bias from this factor will be less for a measure such as RD25 than for low dose slope, but the unusual Horning quantitative analysis of uncertainty in occupational exposure data here could be a starting point for analyzing this.

Best wishes,

Dale

```
----Original Message-----
From: Subramaniam.Ravi@epamail.epa.gov
To: Burch, David <DBurch@icfi.com>;
Scott.Cheryl@epamail.epa.gov; (b) (6
                                                                       >; Hogan.Karen@epamail.epa.gov;
                                                       >; nsteenl@emory.edu <nsteenl@emory.edu>;
White.Paul@epamail.epa.gov; rgentry@Environcorp.com <rgentry@Environcorp.com>; Eftim, Sorina
<sEftim@icfi.com>; Chiu.Weihsueh@epamail.epa.gov; Mendez, William <WMendezJr@icfi.com>
Sent: Wed, Aug 25, 2010 1:25 pm
Subject: NCEA comments on human protocol
Comments from Cheryl (largely), Paul and myself on the human protocol for our 3 pm discussion. These are in addition to those circulated \,
yesterday.
Ravi. (See attached file: NCEA comments human protocol.doc)
Ravi Subramaniam
Environmental Health Scientist
NCEA-Washington, ORD, EPA
N-7922, Two Potomac Yard, Crystal City
(703) 347-8606, (301) 515-2701 (alternate office)
```